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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/972,299	10/05/2001	Richard Leon Ferencz	PGI6044P0211US	4098
32116	7590	06/22/2006	EXAMINER	
WOOD, PHILLIPS, KATZ, CLARK & MORTIMER			BEFUMO, JENNA LEIGH	
500 W. MADISON STREET			ART UNIT	PAPER NUMBER
SUITE 3800				
CHICAGO, IL 60661			1771	

DATE MAILED: 06/22/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/972,299	FERENCZ, RICHARD LEON	
	Examiner	Art Unit	
	Jenna-Leigh Befumo	1771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 22 November 2005.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) 17-22 is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-16, 23 and 24 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 05 October 2001 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
 Paper No(s)/Mail Date 3/02, 9/04, 11/05.
- 4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date. _____.
- 5) Notice of Informal Patent Application (PTO-152)
- 6) Other: _____.

DETAILED ACTION

Election/Restrictions

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
 - I. Claims 1 – 16, 23, ad 24, drawn to a nonwoven composite material, classified in class 442, subclass 340.
 - II. Claims 17 – 19, drawn to a disposable waste-containment garment, classified in class 604, subclass 317.
 - III. Claims 20 – 22, drawn to a disposable garment, classified in class 2, subclass 456.

The inventions are distinct, each from the other because of the following reasons:

2. Inventions I and II are related as combination and subcombination. Inventions in this relationship are distinct if it can be shown that (1) the combination as claimed does not require the particulars of the subcombination as claimed for patentability, and (2) that the subcombination has utility by itself or in other combinations (MPEP § 806.05(c)). In the instant case, the combination as claimed does not require the particulars of the subcombination as claimed because the fine-denier composite material in Group II only requires a fabric with a hydrostatic head to barrier layer basis weight ratio greater than 4.9 cm/gsm, which can be made from meltblown fabrics without having a continuous filament layer with filaments having a denier between 0.7 and 1.2 recited in Group I. The subcombination has separate utility such as a protective outdoor fabric, battery separator, or medical garment.
3. Inventions I and III are related as combination and subcombination. Inventions in this relationship are distinct if it can be shown that (1) the combination as claimed does not require the particulars of the subcombination as claimed for patentability, and (2) that the subcombination has utility by itself or in other combinations (MPEP § 806.05(c)). In the instant

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case, the combination as claimed does not require the particulars of the subcombination as claimed because the fine-denier composite material in Group III only requires a fabric with a hydrostatic head to barrier layer basis weight ratio greater than 4.9 cm/gsm, which can be made from meltblown fabrics without having a continuous filament layer with filaments having a denier between 0.7 and 1.2 recited in Group I. The subcombination has separate utility such as a protective outdoor fabric, battery separator, or disposable personal care product.

4. Inventions II and III are directed to related intermediate materials. The related inventions are distinct if the inventions as claimed do not overlap in scope, i.e., are mutually exclusive; the inventions as claimed are not obvious variants; and the inventions as claimed are either not capable of use together or can have a materially different design, mode of operation, function, or effect. See MPEP § 806.05(j). In the instant case, the products have different mode of operation and different functions since the product of Group II is used to contain waste and the product of Group II is designed to be a disposable medical garment in the shape of a gown.

5. Because these inventions are independent or distinct for the reasons given above and have acquired a separate status in the art in view of their different classification, restriction for examination purposes as indicated is proper.

6. During a telephone conversation with Stephen Geimer on May 12, 2006 a provisional election was made with traverse to prosecute the invention of Group I, claims 1 – 16, 23, and 24. Affirmation of this election must be made by applicant in replying to this Office action. Claims 17 – 22 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

Claim Rejections - 35 USC § 112

7. The following is a quotation of the second paragraph of 35 U.S.C. 112:

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The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

8. Claims 14 – 16, 23, and 24 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

9. Claim 14 recites the limitation "barrier layer basis weight" in lines 11 – 12. There is insufficient antecedent basis for this limitation in the claim. Is the barrier layer basis weight recitation referring to the weight of the first barrier layer, the second barrier layer, or both barrier layers combined together? Claims 15 and 16 are also rejected due to their dependency on claim 14.

10. Claim 23 recites the limitation "the second spunbond" in lines 6 – 7. There is insufficient antecedent basis for this limitation in the claim. The claim does not previously recite the presence of a second spunbond layer. Does the composite have two total layers or three total layers? Claim 24 is also rejected due to its dependency on claim 23.

11. Further, it is noted that claim 4 recites that the "filaments may comprise bicomponent or multicomponent profiles". The term "may" implies that the bicomponent or multicomponent structure is optional. Therefore, the prior art is not required to teach the bicomponent or multicomponent structure to meet this limitation.

Claim Rejections - 35 USC § 102/103

12. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

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(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

13. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

14. Claims 1 – 11, 13, 23 and 24 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Jacobs et al. (5,810,954).

Jacobs et al. discloses a composite fabric containing fine denier fibers produced using the meltblown or spunbond process (abstract). Jacobs et al. teaches that preferably the fine denier fibers have a size between 0.5 and 3.0 denier, preferably less than or equal to about 1.5 denier, and are made by the spunbond process (column 7, lines 60 – 65). The fibers are produced from thermoplastic resins such as polyolefins, polyesters, polyamides, copolymers, and mixtures thereof (column 7, lines 65 – 67). The polyolefin polymer can include polypropylene (column 9, lines 20 – 25) or a copolymer of ethylene and propylene (column 10, 30 – 35). The fibers can also be produced as conjugate fibers (column 8, lines 19 – 20). The spunbond layer can be combined with a meltblown layer and a second spunbond (column 8, lines 45 – 65). The meltblown fibers are between <1 and 10 microns in diameter (column 8, lines 45 – 50). The meltblown fibers are made from polymeric resins such as polyolefin, polyesters, polyamides, etc. (column 8, lines 54 – 56). In the examples, Jacobs et al. discloses that the basis weight of the

individual layers in the composite fabric can be varied between 0.15 to 1.2 osy, or 5 to 40 gsm (column 10, lines 60 – 64). The layers can be bonded by thermal bonding (column 9, lines 3 – 10).

Although Jacobs et al. does not explicitly teach the limitation of the ratio of hydrostatic head to barrier layer basis weight, it is reasonable to presume that said limitations are inherent to the invention. Support for said presumption is found in the use of similar materials (i.e. fine-denier spunbond fabrics, meltblown layers with similar diameter and basis weight) and in the similar production steps (i.e. thermally bonding the layers together) used to produce the multi-layer barrier fabric. The burden is upon the Applicant to prove otherwise. *In re Fitzgerald*, 205 USPQ 594. In the alternative, the claimed limitation would obviously have been provided by the process disclosed by Jacobs et al. Note *In re Best*, 195 USPQ 433, footnote 4 (CCPA 1977) as to the providing of this rejection under 35 USC 103 in addition to the rejection made above under 35 USC 102. Thus, claims 1 – 11, 13, 23 and 24 are rejected by Jacobs et al.

15. Claims 1 – 5, 9 – 11, and 23 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Clark et al. (2002/0009941 A1).

Clark et al. discloses a nonwoven fabric comprising fine denier multicomponent thermoplastic filaments (abstract). A spunbonding process is used to make the nonwoven fabric (paragraph 7). The filaments have a diameter between 5 and 30 microns and a denier between 0.15 to 6 denier (paragraph 26). The filaments can be made from various polymers including polyesters, polyamides, polypropylene, and polyethylene (paragraph 19). The fabric can be combined with other layers, such as films, and other nonwoven fabric to make composite materials including SM or SMS fabrics (paragraph 29).

Although Clark et al. does not explicitly teach the limitation of the ratio of hydrostatic head to barrier layer basis weight, it is reasonable to presume that said limitations are inherent to the invention. Support for said presumption is found in the use of similar materials (i.e. fine-denier spunbond fabrics and barrier layers) and in the similar production steps (i.e. bonding the layers together) used to produce the multi-layer barrier fabric. The burden is upon the Applicant to prove otherwise. *In re Fitzgerald*, 205 USPQ 594. In the alternative, the claimed limitation would obviously have been provided by the process disclosed by Clark et al. Note *In re Best*, 195 USPQ 433, footnote 4 (CCPA 1977) as to the providing of this rejection under 35 USC 103 in addition to the rejection made above under 35 USC 102. Thus, claims 1 – 5, 9 – 11, and 23 are rejected by Clark et al.

Claim Rejections - 35 USC § 103

16. Claims 14 – 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al. in view of Brown et al. (5,939,341).

The features of Jacobs et al. have been set forth above. Jacobs et al. fails to teach producing an SMMS laminate. Brown et al. is drawn to a composite material comprising spunbond and meltblown layers. Brown et al. discloses that a spunbond and meltblown composite have two meltblown layers, as opposed to one meltblown layer equal in basis weight to the two combined, are surprisingly superior (column 4, lines 35 – 40). Therefore, it would have been obvious to substitute two meltblown layers, as taught by Brown et al., for the single meltblown layer in Jacobs et al. since the two meltblown layers have superior properties. Thus, claims 14 – 16 are rejected.

17. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al. or Clark et al. in view of Brown et al. (5,939,341).

The features of Jacobs et al. and Clark et al. have been set forth above. Jacobs et al. and Clark et al. fail to explicitly teach using different polymers in the different spunbond layers. Brown et al. discloses that the spunbond layers in a composite having multiple spunbond layers need not be made from the same polymer (column 5, lines 43 – 45). Therefore, it would have been obvious to one having ordinary skill in the art to choose to use different polymer materials in the different spunbond layers, as taught by Brown et al., in the composite disclosed by Jacobs et al. or Clark et al. to optimize or modify the properties of the composite by using different material which have different properties in the composite fabric. Thus, claim 12 is rejected.

18. Claims 6, 7, and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Clark et al. in view of Jacobs et al.

The features of Clark et al. and Jacobs et al. have been set forth above. Clark et al. fails to teach the basis weight of the meltblown layers in the composite fabric. Jacobs et al. is drawn to spunbond and meltblown composite fabrics comprising fine denier spunbond fibers. Jacobs et al. discloses that the meltblown layers can have a basis weight of between 5 and 40 gsm. Thus, it would have been obvious to vary basis weight of the meltblown layer between 5 and 40 gsm as taught by Jacobs et al., in the fabric disclosed by Clark et al. Further, it would have been obvious to one having ordinary skill in the art at the time the invention was made to optimize the basis weight of the meltblown layer, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. *In re Aller*, 220 F.2d 454, 105 USPQ 233 (CCPA 1955). Thus, one of ordinary skill in the art would optimize the weight of the meltblown layer to minimize the overall weight of the composite while still maintaining optimal barrier properties. Thus, claims 6, 7, and 13 are rejected.

19. Claims 8 and 14 – 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Clark et al. in view of Brown et al.

The features of Clark et al. have been set forth above. Clark et al. fails to teach producing an SMMS laminate. Brown et al. is drawn to a composite material comprising spunbond and meltblown layers. Brown et al. discloses that a spunbond and meltblown composite have two meltblown layers, as opposed to one meltblown layer equal in basis weight to the two combined, are surprisingly superior (column 4, lines 35 – 40). Therefore, it would have been obvious to substitute two meltblown layers, as taught by Brown et al., for the single meltblown layer in Clarks et al. since the two meltblown layers have superior properties. Thus, claims 14 and 15 are rejected.

20. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Clark et al. in view of Jacobs et al.

Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Clark et al. and Brown et al. as applied to claim 14 above, and further in view of Jacobs et al.

The features of Clark et al, Jacobs et al. and Brown et al. have been set forth above. Clark et al. fails to teach using thermal bonding to bonding the multiple layers together. Jacobs et al. discloses composite fabric is formed by running the layers through heated nipped thermal bonding rolls (column 3, lines 49 – 53). Thus, it would have been obvious to bond the multiple layers together via thermal bonding, as taught by Jacobs et al., in the composite fabric disclosed by Clark et al. to produce a composite fabric to consolidate the multilayer fabric. Thus, claims 8 and 16 are rejected.

Double Patenting

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21. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the “right to exclude” granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

22. Claims 1 – 13, 23, and 24 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1 – 3, 7, 8, 11, 13, 14, and 18 of copending Application No. 10/263,482. Although the conflicting claims are not identical, they are not patentably distinct from each other because the scope of 10/263,482 is completely encompassed by the scope of the present application. The only difference between the applications is the intended use of the composite fabric, which is not given patentable weight at this time.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

23. Claims 1 – 5 and 8 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 2, 4, and 5 of copending Application No. 10/266,398. Although the conflicting claims are not identical, they are not patentably

distinct from each other because the scope of 10/263,482 is encompassed by the scope of the present application.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented. However, it is noted that the application has been allowed, but has not been issued as a patent yet. Upon issuing of the patent, the double patenting rejection will no longer be a provisional rejection.

Conclusion

24. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The following patents are related to fine denier spunbond fabrics: Thomas et al. (6,049,024); Najour et al. (6,379,136); and Krishnaswamy-Mirle et al. (2003/0065298).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jenna-Leigh Befumo whose telephone number is (571) 272-1472. The examiner can normally be reached on Monday - Friday (8:00 - 5:30).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on (571) 272-1478. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Jenna-Leigh Befumo

June 13, 2006